

SEQUENCE LISTING

<110> SmithKline Beecham Biologicals S.A.

<120> Novel Compounds

<130> BM45396

<160> 6

<170> FastSEQ for Windows Version 3.0

<210> 1

<211> 675

<212> DNA

<213> *Moraxella catarrhalis*

<400> 1

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gtgattgggg ctgtggcagg tgcacttggc ggtactgccca tttcaaaagc aactgggtggc      180
gaaaaaacag gtcgtgatgc cattttgggg gcggcagttg gtgcagcagc aggggcgtat      240
atggagcgtc aagcaaagca gattgagcaa caaatgcaag gaacgggcgt gactgtaacc      300
cacgataccg acacgggtaa tattaatcta actatgccag gtaatattac ttttgctcat      360
gatgacgata ctttaaacag tgcatttttg ggtcgtttta accagctggc taatacgatg      420
aatcagtatc atgaaacaac gattgtcatt gtaggacata cagactcaac ggtcaagcg      480
gcttataatc aagagctgtc tgagcgtcga gcggattcag tgcgttatta cttgattaat      540
caaggcggtg atccatatcg tattcagaca gtgggggtat gtatgcgaca accgattgca      600
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<210> 2

<211> 224

<212> PRT

<213> *Moraxella catarrhalis*

<400> 2

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Gly Gly Ala Asn Val Asn Lys Ala Val Ile Gly Ala Val Ala Gly Ala
      35           40           45
Leu Gly Gly Thr Ala Ile Ser Lys Ala Thr Gly Gly Glu Lys Thr Gly
      50           55           60
Arg Asp Ala Ile Leu Gly Ala Ala Val Gly Ala Ala Ala Gly Ala Tyr
      65           70           75           80
Met Glu Arg Gln Ala Lys Gln Ile Glu Gln Gln Met Gln Gly Thr Gly
      85           90           95
Val Thr Val Thr His Asp Thr Asp Thr Gly Asn Ile Asn Leu Thr Met
      100          105          110
Pro Gly Asn Ile Thr Phe Ala His Asp Asp Thr Leu Asn Ser Ala
      115          120          125
Phe Leu Gly Arg Leu Asn Gln Leu Ala Asn Thr Met Asn Gln Tyr His
      130          135          140
Glu Thr Thr Ile Val Ile Val Gly His Thr Asp Ser Thr Gly Gln Ala

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145 150 155 160
 Ala Tyr Asn Gln Glu Leu Ser Glu Arg Arg Ala Asp Ser Val Arg Tyr
 165 170 175
 Tyr Leu Ile Asn Gln Gly Val Asp Pro Tyr Arg Ile Gln Thr Val Gly
 180 185 190
 Tyr Gly Met Arg Gln Pro Ile Ala Ser Asn Ala Thr Glu Ala Gly Arg
 195 200 205
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<210> 3
 <211> 672
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 <213> *Moraxella catarrhalis*

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 gtgattgggg ctgtggcagg tgcacttggc ggtactgcca ttcaaaaagc aactgggtggc 180
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 caccataccg acacgggtaa tattaatcta actatgccag gtaatattac ttttgctcat 360
 gatgacgata ctttaaacag tgcatttttg ggtcgtttta accagctggc taatacgatg 420
 aatcagtatc atgaaacaac gattgtcatt gtaggacata cagactcaac gggccaagcg 480
 gcttataatc aagagctgtc tgagcgtcga gcggattcag tgcgttatta cttgattaat 540
 caaggcgttg atccatatcg tattcagaca gtggggtatg gtatgcgaca accgattgca 600
 tcgaatgcaa ccgaagcagg tcgtgctcaa aatcgccgtg ttgagctgat gatttttagca 660
 ccgcagggta tg 672

<210> 4
 <211> 224
 <212> PRT
 <213> *Moraxella catarrhalis*

<400> 4
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 20 25 30
 Gly Gly Ala Asn Val Asn Lys Ala Val Ile Gly Ala Val Ala Gly Ala
 35 40 45
 Leu Gly Gly Thr Ala Ile Ser Lys Ala Thr Gly Gly Glu Lys Thr Gly
 50 55 60
 Arg Asp Ala Ile Leu Gly Ala Ala Val Gly Ala Ala Gly Ala Tyr
 65 70 75 80
 Met Glu Arg Gln Ala Lys Gln Ile Glu Gln Met Gln Gly Thr Gly
 85 90 95
 Val Thr Val Thr His Asp Thr Asp Thr Gly Asn Ile Asn Leu Thr Met
 100 105 110
 Pro Gly Asn Ile Thr Phe Ala His Asp Asp Asp Thr Leu Asn Ser Ala
 115 120 125
 Phe Leu Gly Arg Leu Asn Gln Leu Ala Asn Thr Met Asn Gln Tyr His
 130 135 140
 Glu Thr Thr Ile Val Ile Val Gly His Thr Asp Ser Thr Gly Gln Ala
 145 150 155 160
 Ala Tyr Asn Gln Glu Leu Ser Glu Arg Arg Ala Asp Ser Val Arg Tyr
 165 170 175
 Tyr Leu Ile Asn Gln Gly Val Asp Pro Tyr Arg Ile Gln Thr Val Gly

	180		185		190										
Tyr	Gly	Met	Arg	Gln	Pro	Ile	Ala	Ser	Asn	Ala	Thr	Glu	Ala	Gly	Arg
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 <213> Artificial Sequence

<220>
 <223> Primer

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40

<210> 6
 <211> 62
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Primer

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60
 62